

## ABSTRACT

The present invention relates to a surveying instrument for measuring the distance to a target to be measured, a horizontal angle, and a vertical angle by use of reflected light. An imager can be connected to the surveying instrument. In addition, an arithmetic processing means can determine a three-dimensional position of a plane part by determining from at least three measuring points an equation that includes the plane part as the target to be measured, and then by associating digital image data to which the plane part belongs with the equation so that the plane part is identified.

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